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| Module | Lessons | Vocab & Tools | Standards |
| Expressions and Equations  Expressions and Equations | 1: Generating Equivalent Expressions  2: Generating Equivalent Expressions  3: Writing Products as Sums and Sums as Products  4: Writing Products as Sums and Sums as Products  **Assessment A**  22&23 (from Module 2C): Solving Equations using Algebra  *MARS task (7th grade): Solving Linear Equations*  \*Use resources including  Betterlesson.com (Grant Harris and Heather Stephan)  7: Understanding Equations  8: Using If-Then Moves in Solving Equations  9: Using If-Then Moves in Solving Equations  **Assessment B**  12: Properties of Inequalities  13: Inequalities  14: Solving Inequalities  15: Graphing Solutions to Inequalities  **Assessment C** | New or Recently Introduced Terms  **An Expression in Expanded** **Form** (description) (An expression that is written as sums (and/or differences) of products whose factors are numbers, variables, or variables raised to whole number powers is said to be in *expanded form*. A single number, variable, or a single product of numbers and/or variables is also considered to be in expanded form.)  **An Expression in Factored Form** (middle school description) (An expressionthat is a product of two or more expressions is said to be in *factored form*.)  **An Expression in Standard Form** (description) (An expression that is in expanded form where all like terms have been collected is said to be in *standard form.)*  **Coefficient of the Term** (The number found by multiplying just the numbers in a term together is called the *coefficient of the term*.)  Familiar Terms and Symbols[[1]](#footnote-1)  Distribute  Equation  Equivalent Expressions  Expression (middle school description)  Factor  Identity  Inequality  Linear Expression  Number Sentence  Numerical Expression (middle school description)  Properties of Operations (distributive, commutative, associative)  Term  True or False Number Sentence  Truth Values of a Number Sentence  Value of a Numerical Expression  Variable (middle school description)  **Suggested Tools and Representations**   * Area Model * Coordinate Plane * Equations and Inequalities * Expressions * Geometric Figures * Nets for Three-Dimensional Figures * Number Line * Protractor * Tape Diagram | 7.EE.A.1 Apply properties of operations as strategies to add, subtract, factor, and expand linear expressions with rational coefficients.  7.EE.A.2 Understand that rewriting an expression in different forms in a problem context can shed light on the problem and how the quantities in it are related. *For example, means that “increase by ” is the same as “multiply by .”*  7.EE.B.3 Solve multi-step real-life and mathematical problems posed with positive and negative rational numbers in any form (whole numbers, fractions, and decimals), using tools strategically. Apply properties of operations to calculate with numbers in any form; convert between forms as appropriate; and assess the reasonableness of answers using mental computation and estimation strategies. *For example: If a woman making an hour gets a raise, she will make an additional of her salary an hour, or , for a new salary of . If you want to place a towel bar inches long in the center of a door that is inches wide, you will need to place the bar about inches from each edge; this estimate can be used as a check on the exact computation*.  7.EE.B.4 Use variables to represent quantities in a real-world or mathematical problem, and construct simple equations and inequalities to solve problems by reasoning about the quantities.  a. Solve word problems leading to equations of the form and , where , , and are specific rational numbers. Solve equations of these forms fluently. Compare an algebraic solution to an arithmetic solution, identifying the sequence of the operations used in each approach. *For example, the perimeter of a rectangle is cm. Its length is cm. What is its width?*  b. Solve word problems leading to inequalities of the form or , where , , and are specific rational numbers. Graph the solution set of the inequality and interpret it in the context of the problem. *For example: As a salesperson, you are paid per week plus per sale. This week you want your pay to be at least . Write an inequality for the number of sales you need to make, and describe the solutions.* |

1. These are terms and symbols students have seen previously. [↑](#footnote-ref-1)